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data and recording the extracted data as data for MWB or color balance adjustment in an attached area of each image file is the same as in the first embodiment, and a detailed description thereof will be omitted.

5 According to the characteristic feature of the fourth embodiment, image pickup element fluctuation adjustment data recorded in an image pickup element fluctuation adjustment data recording area (memory) or adjustment data unit 419 of this image file as data
10 obtained by picking up images of a white sheet under each of two different specific light sources are recorded in a specific part of the attached area.

 Image pickup element fluctuation adjustment data, i.e., image pickup data 1203 and 1205 of two different
15 light sources obtained by using a reference image pickup apparatus shown in Fig. 10 and image pickup data 1204 and 1206 of two different light sources unique to each image pickup apparatus for each color component of R, G1, G2, or B, are recorded by the adjustment data
20 unit 419 in the area attached to the image file. This embodiment uses two different light sources. However, adjustment precision is improved when the number of types of light sources increases. Although the adjustment precision is not improved so much, the image
25 pickup element fluctuation adjustment can be also attained by using only one kind of light source.

 These image pickup element fluctuation adjustment

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data which is written in the memory of each image pickup apparatus at the time of shipment, are read out by a readout means (not shown) in each image pickup operation and then written in a single file together with the MWB white sheet data and color balance data.

The average value of all or some image pickup data for each color component of R, G1, G2, or B, obtained when picking up the image of a light source, is used as such image pickup element fluctuation adjustment operation data.

As in the above three embodiments, when the attached data of a file selected by a selection data reproduction unit 410 shown in Fig. 4 is read out, the fluctuation adjustment data are also read out and reproduced.

An adjustment operation unit 420 adjusts these fluctuation adjustment data in the following manner and supplies the resultant data as R, G1, G2, and B data for MWB or color balance adjustment to a gain control value operating unit 4111. The gain control value operating unit 4111 calculates gain control values for MWB and color balance adjustment.

Referring to Fig. 10, an image pickup apparatus 1201 records MWB and color balance adjustment data on a medium. An image pickup apparatus 1202 reads out the MWB and color balance gain adjustment data recorded on the recording medium and performs gain adjustment.